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The Development of Anesthesia in South Africa.

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and S. (Eng.), Durban, South Africa

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In Homage to Dr. McMechan.

Prof. Lucien Dautrebande, Liege, Belgium

A Tribute to Dr. F. H. McMechan.

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been produced by amateur companies in Cincinnati. This experience enabled him to dramatize meetings in later years. With eight years of Latin, Greek and German, and with his six years of chemistry, physiology and other laboratory sciences he was able to complete the medical course in three years.

The Early Position of Anesthetists

THERE were few anesthetists at this time and consequently there was rarely any attempt at organization. In 1856, ten years after Dr. Morton's first public demonstration of ether anesthesia, the first Society of Anesthetists was organized in England. When McMechan began practice in Cincinnati, the only existing group of anesthetists in the United States was the Long Island Society of Anesthetists, (1905), in Brooklyn. Its membership and interests were local and were chiefly concerned with methods and techniques.

In most hospitals, anesthesia was looked upon as of minor importance, usually being administered by the junior intern who received instruction from his predecessor. Perfection came by the often unpleasant experience of trial and error. Anesthesia was considered necessary but undesired part of the training of a surgeon.

Students and interns educated under such an environment had little desire to become "etherizers." Subsequently nurses were trained as anesthetists, a practice which provided additional income to hospitals. Chloroform, ether, and ethyl chloride were the principal anesthetics in those days. The use of nitrous oxide-oxygen and local anesthesia was limited. The chief aim in operating was speed in order to reduce the hazard of anesthesia to a minimum. An occasional physician developed unusual skill as an anesthetist and was in demand by surgeons and the laity, but by and large anesthesia was considered as one of the necessary evils of surgery.

McMechan the Anesthetist

AT the beginning of practice McMechan's special interest became centered in anesthesia. He read everything that he could find printed on the subject. Through practical demonstration of his ability he received the appointments of Anesthetist in St. Mary's and City Hospitals, and that of Visiting Anesthetist in Christ and Bethesda Hospitals. He was a full time anesthetist. He purchased the best anesthetic apparatus that was obtainable, and corresponded with every doctor who was known to be giving special attention to anesthesia.

He punctually attended medical meetings, taking part in discussion of every paper that had a bearing on anesthesia. He was a prodigious writer as well and whenever possible, on the day before reporting on cases, he visited his patients for further check-up. Complete records were kept of all of his anesthesia patients, an unusual custom at that time. His wife remarked, "He lived and breathed anesthesia. My interest in anesthesia grew with our friendship and after we were married, I often accompanied him to the operating room, and donning operating room clothes helped him in the details of his work."

Many medical friends attempted to discourage him from devoting his life to such an unpromising field.

From 1903 to 1910 he enjoyed a busy life in the practice of anesthesia. On June 5, 1909, in Chicago, he married Laurette van Varseveld of Paris, France, whom he had met when he was director, and she was a



Fig. 1. McMechan-The Anesthetist

student, at the Shuster School of Acting in Cincinnati. He would often discuss with her the plays he had written in order to get the woman's point of view. Mrs. McMechan was a direct descendant of the sister of Baron Dominique Larrey, Napoleon's surgeon-in-chief. Furthermore it was Larrey who supported Dr. Henry Hill Hickman, when in 1828 he

demonstrated anesthesia before the French Academy of Science and pleaded for further research in the relief of pain.

A year and a half after his marriage, McMechan was stricken with a gradually disabling arthritis, which forced him to give up the practice of anesthesia and to confine himself to life in a wheel chair. In 1929, returning from an eventful trip to Australia and New Zealand, he told a reporter of the Chicago Evening Post "I feel that my disability has been a dispensation of Providence that has enabled me to dedicate my life to doing bigger and better things for humanity." During conversation a twitch would occasionally pass over his face, as he endeavored to assume a more comfortable position. Through twenty-eight years of illness, he carried on, never once admitting possibility of defeat or uttering any word of complaint.



Fig. 2. The McMechans at the Curtis Home

Unable to follow his ambition in administration of anesthetics, he turned to the much needed organization of the specialty. In these days of widespread interest in anesthesiology, it is hard to realize the inertia, lack of vision, and even antagonism that was present on every hand. Nevertheless with a vision of what ought to be, he launched out with a determined effort to make it a reality. Someone has said "A genius is a man who shoots at something no one else can see, and hits it."

For a time the McMechans lived at Avon Lake, Ohio, travelling about three months each year for the cause of anesthesia. In 1929 the McMechans moved to Hotel Westlake, Rocky River, Ohio, where anesthesia headquarters were established. Here McMechan lived and worked until his death. Here is still located the office of the organization which

he established, his work being continued by his faithful and accomplished wife.

Medical Publications

WHILE living at Avon Lake, Dr. Joseph McDonald, Secretary of the *American Journal of Surgery*, providentially arranged the publishing of a *Quarterly Supplement on Anesthesia and Analgesia* in that Journal. Though later importuned to sever these relations and launch a publication entirely devoted to the subject, McMechan continued the editorship of the popular *Quarterly Supplement* (1916-1926) until the death of his benefactor.

During 1915-1916 and 1917-1918 he launched two year-books on Anesthesia and Analgesia. These selections of scientific papers were well chosen and carefully edited. The volumes contained about 500 pages each, and recorded the year's advances in anesthesia.

In 1919-1923 he simultaneously edited the *Ohio State Medical Journal*, where his work was widely and favorably recognized. Work in this field was later discontinued when pressure of his activities in anesthesia became too great.

On discontinuing these publications a new Journal appeared in August 1922, *Current Researches in Anesthesia and Analgesia*. This was the first medical journal in the world devoted entirely to anesthesia. For a quarter of a century it has been the official organ of the International Anesthesia Research Society, bringing anesthesia before the medical profession and inspiring further research. With an ever increasing bi-monthly circulation of about 3,000, it has a global distribution. Iran has recently been added to the list. It may be found in every medical college library in the world. There has been considerable demand from some countries to have it translated into Spanish. It continues to be published under the same high ethical standards and quality of scientific papers by Howard Dittrick, M.D. as directing editor, and Laurette McMechan as assistant editor under the direction of the Board of Governors of the International Anesthesia Research Society. It continues as an international forum for anesthetists. The policy has been to encourage research and clinical papers among the younger men of the specialty, realizing that they will be the leaders of tomorrow.

Anesthetic Organizations

McMECHAN believed that organization was more important than the mechanism in accomplishing it, so he encouraged the founding of new organizations or their combining, as the case might be, in order more effectively to accomplish advancement.

The American Association of Anesthetists was organized at Minneapolis, Minn., in June 1912 under the guidance of Dr. William Seaman Bainbridge, New York surgeon; Prof. Yandell Henderson, of the Yale Medical School of Applied Physiology; and Dr. James Taylor Gwathmey, New York Anesthetist. Dr. Gwathmey was the first president and later

the secretary. When he entered the army medical service of the first world war, he turned this work over to McMechan.

In order to stimulate interest in Anesthesia in the central and southern parts of the United States an organization known as the Interstate Association of Anesthetists was formed under the sponsorship of William Hamilton Long, M.D. of Louisville, Ky., and E. I. McKesson, M.D. of Toledo, Ohio, with Dr. McMechan as organizing secretary. The first meeting was held in Cincinnati, Ohio in 1915, with an attendance of nearly 300.

Later to make a larger and more coherent organization of anesthesia, a reorganization plan was devised better to serve its rapid growth. Under this plan the American Association of Anesthetists became the Associated Anesthetists of the United States, (soon changed to the Associated Anesthetists of the United States and Canada) and the Interstate Association of Anesthetists—a regional branch of the Associated Anesthetists of the United States and Canada. Other regional societies were formed under the names of Eastern, Southern, Pacific Coast, and Canadian.

The Pacific Coast Society of Anesthetists later resolved itself into the Section of Anesthesia of the California State Medical Society, because of the distance from geographical center and desire of local contacts with their State Medical Society. For similar reasons the Canadian Society of Anesthetists became the Section on Anesthesia of the Canadian Medical Association, and the Southern Association of Anesthetists became a Section in the Southern Medical Association. The Mid-Western and Eastern then combined with the Associated Anesthetists, which later affiliated with the International Anesthesia Research Society in order to relieve the ever increasing load from the shoulders of McMechan, Secretary-General.

During the active years of the regional societies, yearly Congresses of Anesthetists were held in joint session with the local regional organizations in various regional areas. These occasions were largely managed by McMechan and his wife, who were in constant contact with the various secretaries, assisting them in programs and organization matters.

One of these memorable meetings was held in Boston on "Ether Day" 1928. The Congress was composed of the Eastern Society of Anesthetists, Associated Anesthetists of the United States and Canada, International Anesthesia Research Society, and the Boston Society of Anesthetists. After placing a large wreath on Morton's grave with appropriate remarks by Dr. A. H. Miller, the Congress adjourned to the famous Bullfinch Amphitheater of the Massachusetts General Hospital where the members listened to the address of Dr. McMechan, as he presented to the hospital a bronze bust of Morton, as he was supposed to have looked at the time of his first public demonstration of ether anesthesia. The audience was held spellbound in the same room where Dr. Warren had uttered the words "Gentlemen, this is no humbug!" They forgot the infirmity of the speaker as he said, "I cannot challenge your attention more dramatically to the value of the anesthesia than to ask you,—“What would happen tomorrow, if anesthesia were blotted from the world today? You can realize the whole structure of modern surgery, a great part of medical



Fig. 4. Congress Banquet, Adelphia Hotel, Philadelphia, Pa., October 22, 1936



Fig. 5. Congress Banquet, McAlpin Hotel, New York, N. Y., October 19, 1938

practice, and most laboratory research would go crashing into the abyss of oblivion. You cannot conceive of pain going on without surcease from pain in face of the fact that day by day as many casualties of peace drift into our hospitals as were evacuated from the trenches in the world war." Again we were thrilled with the prophetic words,—“The world is changing for the better; old ideas are forgotten and new ideals take their places to shape our destinies for better things. Out of strife and enmity come understanding and brotherhood, barriers are broken down and frontiers vanish; anesthesia knows no limitations; its arms are spread wide to all those who wish to relieve pain and to those who suffer pain.”

Under such guidance world-wide anesthesia was launched. The scientific papers, interesting commercial and scientific exhibits, clinics, and demonstrations intermingled with friendly contacts of physicians in like activities, made these meetings of anesthetists unique among medical specialties. There was a yearly increase in attendance and interest. It became one of the annual necessities for those who were interested in the latest advances in anesthesia.

The importance of these special events is emphasized in the paper of Howard W. Haggard, M.D. Department of Physiology, Yale University, read before the American Society of Anesthetists meeting October 12, 1909.⁶ “Thus gentlemen it seems to me that the future position of the anesthetist in American medicine is largely a matter of social change. The anesthetist will not establish his position by laboratory and clinical research alone, or by the development of new anesthetics and new apparatus. He will establish it only when he deals with the important but often neglected social feature. Even in spite of this neglect by most anesthetists the fact remains that the anesthetists have during the last decade made more progress towards establishing their specialty than any other group of the profession. So far the progress has been mainly from within. It has been organization, the founding of journals and sections, and the insistence on better teaching of anesthesia. And I do not need to tell that for this progress you owe a great debt to one of the most socially-minded and certainly one of the bravest men I have ever met, Dr. F. H. McMechan.” In summing up his character, Dr. Ralph M. Waters thus describes Dr. McMechan,—“Emotional and brilliant, true-blue, and steadfast with a moral determination to stand for what he believed right, McMechan was utterly incapable of shilly-shallying or compromise.” He thoroughly believed that there was no place in the practice of medicine for the lay anesthetist. From an article in the October 1936 issue of *Medical Economics*,⁴¹—“The Autocrat of the Breakfast Table, Dr. Oliver Wendel Holmes, once wrote, “Nothing is too good for the patient!” This axiom has been made effective in many phases of medical practice during its evolution. Old wives and their remedies have been replaced by the internist; barbers and their blood letting have been superseded by qualified surgeons; midwives and their traditions have given way to expert obstetricians. In view of this it is inconsistent to believe that anesthesia, the greatest boon to suffering humanity, can rely for its future on the lay technicians.”

The following is taken from an address which McMechan gave in

1935 before the joint session of the Council on Medical Education and Hospitals of the American Medical Association with the Federation of State Medical Licensing Boards. He represented the group of Anesthetists in the discussion, "Should the Radiologist, the Pathologist, and the Anesthetist, Be Licensed to Practice Medicine?" It clearly presents his views on medical anesthesia.⁴⁰ "The code of medical ethics has come to me, representing the third generation of Ohio doctors in my family, as a sacred heritage, as one of the group of doctors to pass the first Ohio State Medical Board examination, my license to practice has always meant a very personal property right to me, and an experience of thirty years in anesthesia has convinced me that anesthesia must be limited to licensed and qualified physicians to achieve its destiny—the conquest of human pain.

Anesthesia was the gift of pioneer doctors and dentists to suffering humanity, and every significant advance in its science and practice has been contributed by doctors and dentists, technicians have added nothing of any consequence. Anesthetics are among the most potent and dangerous drugs used in the practice of medicine; they penetrate to every cell and organ of the body and may cause almost instant or delayed death by their effects. The dosage of general inhalation anesthetics cannot be prescribed in advance but must be determined from moment to moment during administration. The dosage of local and other anesthetics must be determined by the risk of the patient, the nature and duration of the operation to be done—certainly a challenge to the knowledge and experience of the keenest doctor.

No patient should ever be given an anesthetic whose condition and risk has not been diagnosed in advance of the operation, so that every resource of medical science can be used to lessen the risk and make the recovery more assuring. Certainly in this preoperative evaluation and the selection of the safest anesthetic and best method of administration, the medical anesthetist is more in a position as a consultant than a technician.

The safety of the patient demands that the anesthetist be able to treat every complication that may arise from the anesthetic itself by the use of methods of treatment that may be indicated. The medical anesthetist can do this, the technician cannot. More recent developments have extended the field of medical anesthesia to include resuscitation, oxygen therapy and therapeutic nerve block for intractable pain, and treatment of various conditions of disease and the rehabilitation of the disabled—all fields of practice quite beyond the capacity of the technician."

In a recent paper by Harris and Eversole, of the Lahey Clinic in Boston, the specialty of anesthesia is appraised as follows: "It is doubtful if any other specialty has been subject to more abuse and exploitation in lower quality of service to the patient."

As Secretary-General of various anesthesia societies, McMechan represented the professional medical anesthetist and was forced personally to bear the impact of this opposition to the fast advancing specialty of anesthesiology. Most of the medical profession now agrees with McMechan's views, at least in theory. As the years go by, all will agree.

The increasing demand of the enlightened public for better and safer anesthesia is a powerful incentive. Erstwhile opponents will sink into oblivion, but courageous McMechan will continue to live in the memory of anesthesiologists, and of the myriads of grateful patients he has indirectly benefited.

Quite universally all agree with Dr. Albert H. Freiberg, professor of orthopedic surgery at the Medical College of Cincinnati, as he said,—“I admire especially his insistence upon the view that general anesthesia should always be administered by a physician and no one else; that it is a field meriting profound study and thorough preparation preliminary to abandoning one's self to it as a life career.”

As early as December 18, 1919, it became evident that the development of the scientific side of the specialty was closely connected with the manufacturing of proper anesthetic apparatus and drugs, for on this date a group of manufacturers and professional anesthetists met in the Union Club in Cleveland, and with the help of McMechan organized the National Anesthesia Research Society, with manufacturers and professional anesthetists as members. After the organization was thoroughly established the manufacturing interests withdrew, leaving it entirely a professional organization. The name was then changed to International Anesthesia Research Society. However, the spirit of mutual cooperation between these two groups still continues.

Through the following years this organization has published *Current Researches in Anesthesia and Analgesia*; presented various awards and citations for distinctive service to the specialty; organized the first International College of Anesthetists in the world; and allotted thousands of dollars to various research workers and research institutions for scientific investigation in the field of anesthesia. This is the great purpose of the organization and the final ambition of McMechan, its founder. He is no longer here to plead for the cause of anesthesia, but this research fund which he established continues to function quietly.

After unsuccessful attempts in 1911 and 1912 to obtain a Section in Anesthesia in the American Medical Association, it became evident that the only valid objection to this request was the fact that anesthesiology did not have a sufficient scientific research background to warrant such a rating. The early recognition of this condition by McMechan was the motive for focusing his energies to remedy the situation.

Few clinical anesthetists had the time, facilities or ability to bring this about. He then hit upon the happy solution by inviting workers in the various laboratory sciences to cooperate with the clinical workers (the anesthetists) in the prevention of pain. He dramatically pointed out the advantages of this type of work over their former abstract and routine efforts in the field of science. It was the anesthetist that filled the gap between the laboratory and the operating room.

Eternal gratitude of the specialists in anesthesia is due this fine group of laboratory specialists for the splendid way they reacted to this invitation. The result was astounding. Medical laboratories became busied with anesthesia research. Commercial houses redoubled their efforts in

developing new drugs and apparatus for improved administration. Various medical journals and the lay press began to carry more anesthesia copy. In short the medical profession in particular and the lay public in general became more conscious of anesthesia. With the development of such a favorable scientific background it became a relatively easy matter to obtain in 1940 a section in anesthesiology in the American Medical Association.

International Expansion

McMECHAN had a world-wide vision for the specialty. To him human suffering knew no boundaries, his every thought and action concerned relief of suffering in others.

Through the efforts of Dr. Cox, the secretary of the British Medical Association, an invitation was extended to American anesthetists to at-



Fig. 6. Joint meeting of Canadian and British Medical Association, Winnipeg, Man., Canada together with Joint Session of Canadian Society of Anesthetists and the International Anesthesia Research Society. Taken on roof of Royal Alexandria Hotel

tend the 1926 British Medical Association meeting in Nottingham, England. A travel group of 17 anesthetists and their wives was organized for an extended European trip. Dr. and Mrs. McMechan were formally presented to the British Medical Association as distinguished American guests.

The group also attended meetings of the Royal Society of Medicine of London, Section of Anaesthetics, and similar anesthetic societies in Glasgow, Edinburgh, and Ireland.

the 1937 Congress of Anesthetists in Chicago, where he was to be presented the Congress Loving Cup. The inscription reads:

To
F. Hoeffler McMechan, A.M., M.D., F.I.C.A.
Editor, Secretary-General
Laurette Van Varseveld McMechan
Associate Editor, Secretary and Hostess
In Loving Appreciation of
Devoted Services and Splendid Achievements
for
Organization, Economics, Research,
Practice, Teaching, Journalism, and Fellowship
of the
Specialty of Anesthesia
for
The World Conquest of Human Pain
In Behalf of Suffering Humanity
Presented By The
International Anesthesia Research Society
and
International College of Anesthetists
Sixteenth Annual
Congress of Anesthetists
1937

He sent this touching reply, which was read that evening. "Only such a token as one of your Congress Loving Cups could possibly symbolize your appreciation and recognition. However, this gift is far more yours than ours, because in everything we have tried to do for you and anesthesia, you have taken the greater part.

Your memberships are in reality Organized Anesthesia itself, and your loyalty in maintaining your membership is what has finally created International Anesthesia. The present financial stability and the promising economic future of the specialty is the result of your support in good times and bad.

Your Liaison with basic science, which may be one of your proudest boasts, is the friendliness of that group of research workers who have come to our meetings for years to find out our problems, and who then opened the doors of their laboratories to show us the solution of our problems. May the liaison prosper for years to come in our mutual co-operation.

Clinical anesthesia is what through years of pioneering each and every one of you have made it. Now it remains for all of us to bestow the heritage we have won for ourselves, to others, knowing that they will carry on splendidly. In doing this the best interest of surgery, the patient, and the hospital will be served. Added to this are those who

must shoulder the burden of reaching and instructing each new generation of anesthetists so that the specialty may never lag in carrying out its greatest obligation.

Your journal publishes the very best of your own and others research and clinical advances as reported at your meetings and Congresses, and



Fig. 8. Frank and Laurette

stands as an assurance that you are doing more than your share to realize the world conquest of human pain.

Our part in this marvelous labor of love has been the tie that binds your efforts together for effective achievement through cooperation that has become one of the most astounding fellowships in the allied professions and basic sciences.

Needless to say that this gift of gifts will be cherished for all the years to come as the most precious souvenir of our lives and work; but never forget that in treasuring it we will also keep all of you in our heart of hearts, because it is you who have made our lives, work and friendships the greatest compensation that a kindly Providence could possibly bestow."

No matter how severe his illness he always seemed to recover and improve. As late as May 11, 1939, he attended and organized a meeting in St. Louis, Missouri. With marvelous courage and will-power he continued working to the end, which came June 29, 1939. Thus ended a life of vast accomplishments in spite of physical handicaps that would have made most of us give up in despair.

Before the days of the United Nations, International College of Surgeons, and International College of Physicians he had placed anesthesia on an international basis. He stepped outside national boundaries and became a man of international stature.

1932 SOUTH SALINA ST.

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The Development of Anesthesia in South Africa.*

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King George V. Hospital for Diseases of the Chest*



IT IS NOT the first occasion on which a South African has been privileged to read a paper before the Congress of Anesthetists, and this invitation to me is a high honor and one for which I am indeed grateful, especially as it is to be delivered at this special session as a tribute to the late Dr. F. H. McMechan.

It was about ten years ago after meeting Dr. McMechan of Cleveland, that my conversion took place from anesthetist technician to anesthesiologist. I was the guest of Dr. and Mrs. McMechan for a few days and had the good fortune to have protracted talks from which I received inspiration and guidance which, as I have already said, set me upon the right road. A clinic tour was arranged for me and facilities were afforded, through the good offices of Dr. McMechan, of visiting many centers in the U. S. A. and Canada where great progress had taken place in the field of Anesthesia.

On my return to South Africa, like my colleagues who had been guided likewise by Dr. McMechan, I immediately began to put into practice what I had learned and to pass on the knowledge acquired to those around me.

The development of anesthesia in South Africa can best be dealt with as follows:

- (1) *From 1847-1922:* The 75 year period which followed the first use of ether for a surgical operation on June 16th, 1847 in Grahamstown, South Africa.
- (2) *From 1922-1947:* The 25 year period initiated by the founding of the first two medical schools, University of Cape Town, and University of Witwatersrand, Johannesburg.
- (3) *From 1947—Onwards.*

1. 1847-1922

ACCOUNTS have recently been given by anesthetists all over the world of the first use of ether in surgery, each in his own country, and it may interest you to have such an account from South Africa. W. Guybon Atherstone had been sent to England by his father, Mr. John Atherstone, to the Royal College of Surgeons, London, and returned to practice in Grahamstown in the Eastern Cape Province in 1839. Grahamstown was at the time just an outpost and the surrounding country was subjected to almost continuous raids by marauding bands of natives. Dr. Atherstone gave an account of the first use of ether in South Africa in an address which he delivered to the Fourth Medical Congress, held

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in Grahamstown in 1896. He was then in his 80th year. He was elected President of the Congress, and was by then completely blind.

Here is an extract from his address:¹

“The evolution of medical science led naturally to the discovery of ether, the vapour of alcohol, in the following year 1847, when the news reached me direct from the U. S. A. by sailing vessel en route for England. I had no details whatever supplied me, and knew nothing of Simpson’s work in Edinburgh. However, I at once had an opportunity of trying it.

Mr. F. Carlisle, Deputy Sheriff for Albany, about 27 years before had lost almost the whole of the calf of his leg from erysipelas, terminating in gangrene, which nearly proved fatal. From this, very great retraction of the leg resulted, and for a few years an irritable ulcer extending up into the bend of the knee had occasioned him so much suffering and annoyance, that he would have gladly got rid of the useless limb years previously but for dread of the operation.

After several experiments with different kinds of apparatus, with and without valves, which it is unnecessary for me to describe, I succeeded in producing the requisite degree of insensibility to pain by means of a simple contrivance somewhat resembling the Turkish narghili or “hubble-bubble” in principle.

It consisted of a large wide-mouthed bottle, capable of holding two quarts, and the cork had two holes through it. Into one of these a glass tube half an inch in diameter was fitted, and extended to within a quarter of an inch of the surface of the ether. In the other hole an elastic tube with an ivory mouthpiece was fixed for inhaling the vapour. About two ounces of ether having been poured down the glass tube, both tubes were stopped for some minutes to allow the vapour to fill the bottle before inhaling. Then everything being properly prepared, I got Mr. Carlisle’s consent, and assisted by my father, Mr. John Atherstone, District Surgeon, Dr. Hadaway, 91st Regiment, and Dr. Irwin, 27th Regiment, I amputated his thigh in its lower third on Wednesday, the 16th. June, 1847. This was its first use out of America and Europe.

The following dialogue which took place between the patient and one of the medical men present will show how far we were successful in producing anaesthesia.

“It’s very odd” said Mr. Carlisle “do you know I fancy I am *still* holding my nose.”

“Well” replied Dr. Irwin “so you are, most energetically, too.”

“Then why remove the vapour.”

“Because the operation is all over. Your leg has been off some time now.”

“Now don’t talk nonsense to me. I’m a reasonable man you know. Explain why the bottle is gone.”

“You don’t want it any longer. Your leg is off” Mr. Carlisle.

“What, my leg taken off? Impossible—I can’t believe it. Let me see for myself” and on seeing the stump he burst out “God be praised. It’s

the grandest discovery ever made. We must erect a monument to this fellow's memory. It's the greatest boon ever conferred on man. I have been totally unconscious of everything."

The Grahamstown Journals of June 19th, 1847 and the 26th, 1847 gave an account of the operation and the subsequent progress of the patient.

It is a far cry from Boston, U. S. A. to Grahamstown, South Africa today, but who can imagine what it must have been in 1846.

This 75 year period was a "rag and bottle" period, although Atherstone himself before he used ether experimented with valves, as he has told us. Chloroform, ether, ethyl chloride administered "open" was the vogue, and now and again the Clover Inhaler was used by some of the more enterprising men. Regional anesthesia was practiced very infrequently, and only by those who had had European Continental training.

Nitrous oxide was almost never used except perhaps occasionally by dentists, and only very infrequently for some other surgical procedure mainly because of the prohibitive cost of importation of the gas. This in brief covers the first three quarters of the century.

2. 1922-1947

(a) The founding of the medical schools—Appointment of lecturers in Anesthesia, and first Specialists in Anaesthesia in South Africa. This period marks the greatest progress in the development of Anesthesia in South Africa. Early during this period two medical schools were instituted, University of Cape Town, and University of Witwatersrand, Johannesburg, and the first two pioneers to devote themselves entirely to the practice of anesthesia were Dr. G. Bamfylde-Daniel of Cape Town, and Dr. Benjamin Weinbren of Johannesburg.

Dr. Bamfylde-Daniel used nitrous oxide, but prohibitive cost only allowed of its use somewhat sparingly. Dr. Bamfylde-Daniel was the first practicing specialist in Anesthesia in South Africa, and retired in 1928, but still maintained an active interest in the specialty. I received my lectures in anesthesia from him as he was the first appointed lecturer in anesthesia at the University of Cape Town, where I graduated. He was a very able anesthetist of an inventive turn of mind, and wrote many papers on various aspects of anesthesia.

Dr. B. Weinbren commenced specialist practice in Anesthesia at about the same time as Dr. Bamfylde-Daniel, and is still in practice in Johannesburg. Apart from his ability as an anesthetist, Dr. Weinbren has played a very active part in the University development in Johannesburg, has been a member of the Senate of the University, Senior lecturer in Anesthesia, Senior anesthetist to the Johannesburg General Hospital, President of the Southern Transvaal Branch of the Medical Association of South Africa, and the first President of the South African Society of Anaesthetists.

Dr. Weinbren visited the U. S. A. and spent a profitable period with the late Dr. E. I. McKesson and his associates, and with other well-known anesthetists in the U. S. A. and was responsible for popularizing the use

of nitrous oxide in South Africa. He was a member of the Government Commission appointed to inquire into "Anaesthetic Mortality in the Union of South Africa in 1936." His visit to the United States undoubtedly was a stimulus to him, and he started us off in South Africa on the right path.

Following upon the footsteps of Dr. Bamfylde-Daniel came Dr. Royden of Cape Town, who has visited you twice, and has been privileged to tell you on both occasions how much has been gained by our contact with the anesthetists of the U. S. A. He has as Lecturer on Anesthesia to the University of Cape Town, and Senior Honorary Visiting Anaesthetist to the Groote Schuur Hospital, Cape Town, given the benefit of his experience to the students of the University of Cape Town and Resident Anaesthetists, and has done a great deal to encourage others to enter the important field of anesthesia. Others like myself have visited the United States and have done our best to emulate your methods, and have even succeeded in setting up small departments at the particular hospitals to which we are attached.²

(b) The appointment of a Government Commission to investigate Anaesthetic Mortality in South Africa. Apart from a few men who entirely devote themselves to Anesthesia, the great majority of anesthetics in South Africa during the past 15 years of this period were administered by doctors in general practice, who were also appointed to hospital staffs as honorary visiting Anaesthetists. This type of practice did not improve the status of the Specialty, although some of the general practitioners became very skilled in the administration of anesthetics. The country was ill served with skilled anesthetists, and surgeons were becoming bolder, and anesthetic mortality in South Africa rose by leaps and bounds.

In January, 1936 because of grave public disquiet, the Government appointed a Commission to investigate the cause of this alarming mortality from anesthesia.

The Commission of Inquiry had at its disposal records of 203,159 operations, and the most important recommendation of the Committee was: "That every reasonable facility should be provided to ensure that medical students, and resident medical officers have every opportunity of acquiring adequate practical experience in the administration of anaesthetics. Further, it was considered desirable that in hospitals, even those not associated with medical schools, trained anaesthetists should be employed, and it should be part of their duty to impart instruction to the resident medical staff on the administration of anaesthetics."

The Commission made certain recommendations regarding enquiry into anesthetic deaths in view of the unsatisfactory position of anesthesia.³

In a paper entitled "Preventable Mortality and Morbidity in Anaesthesia" published simultaneously with the recommendation of the Commission on anaesthetic mortality, attention was drawn by me to the unsatisfactory method of enquiries into deaths on the operating tables.⁴

The Commission served a most useful purpose and did a good deal towards reducing anesthetic mortality in South Africa.

(c) Registration of Specialists in Anesthesia. Just about the time

of publication of the recommendations of the Commission on Anaesthetic mortality, the South African Medical Council, a statutory body corresponding to the General Medical Council in England, and our governing medical authority, established what is known as a "Specialist Register." This was done to protect the public from pseudo-specialists, and also to protect medical men who really were specialists by virtue of the fact that they had had long clinical experience and postgraduate training, and taken higher qualifications. Certain rules and regulations were promulgated for all specialties, and anesthesia was recognized as one of the specialized branches of medicine.

No medical practitioner can be considered by the S. A. Medical Council for registration as a specialist in anesthesia unless he has done two years in general practice subsequent to graduation, or he has held resident appointments in medicine and surgery for at least one year, and additionally has spent one year in a department in a hospital in which is included the teaching of anesthesia under the supervision of a Specialist Anesthetist or "such practical experience as in the opinion of the council is equivalent thereto."

Recently the regulations for specialization have again been revised, and as far as the specialty of anesthesia is concerned, the applicant is required to be in possession of a higher qualification, e.g. D. A. (Diploma on Anaesthesia), and it is laid down that no graduate of under 5 years standing can be considered for registration. Further, it is necessary to have held resident appointments in surgery, medicine, ear, nose, throat, (6 months each), and taken a course in psychology. Thus registration in anesthesia is being made more difficult, but in the interest of the public, and certainly status of the specialty will be further raised.

The Examining Board of the College of Surgeons of England and the Royal College of Physicians, London, because of pressure from the Association of Anaesthetists of Great Britain and Ireland, and because of enquiries from the Colonies (South Africa)⁵ decided to institute the Diploma in Anaesthesia of the Royal College of Physicians and Surgeons, and November, 1935 was the first occasion on which the examination was held in London.

The D. A. (Honorary) was bestowed on the pioneers in anesthesia in South Africa, attached to the two medical schools.

Others in South Africa desirous of registration as Specialists in Anaesthesia, proceeded when opportunity afforded itself to England to sit for the D. A. in London, because the medical schools in South Africa were showing no great interest in anesthesia. The expense connected with obtaining the D. A. in England was such that only very few could afford to proceed to England, and during the war years as far as South Africans were concerned it was quite out of the question. The outcome has been the institution of such a higher qualification at the Witwatersrand Medical School, Johannesburg, this year.⁶

(d) National Health Services Commission 1942-1944. In 1942 a National Health Services Commission was appointed by the Government to investigate on the provision of an organized National Health Service

for all sections of the people of the Union of South Africa⁷ and I presented a memorandum on an "Efficient Anaesthetic Service in South Africa."⁸

The final report of the Commission contains the following statement under the heading of "Anaesthetics"—"The administration of Anaesthetics should as far as possible be regarded as the work of an Anaesthetic Specialist. We were impressed by the evidence showing there was an unnecessary mortality from this cause. In small areas it might not be feasible to provide a full-time anaesthetist, but the medical practitioner administering anaesthetics should have special training."

Midwives who have had a three year course of training would be allowed to administer anesthesia in confinement cases.

(e) Founding of South African Society of Anaesthetists. On August 1st, 1943, a very important event occurred in South Africa, the organization of the South African Society of Anaesthetists, its main aims being:

- (a) The promotion of the science of anesthesia.
- (b) The correlation of the interests of all practicing Anaesthetists in South Africa, and the determining of the relationships which should exist between anesthetists, between anesthetists and hospitals (public and private) Government authorities, the general public and medical profession in general.
- (c) To represent and further the interests of anesthetists.

Registered Specialists in Anaesthesia only are eligible for membership. The South African Society of Anaesthetists is a recognized sub-group of the Medical Association of South Africa. It has in spite of the wide geographic distribution of its members met annually and has played an important role in its short life in furthering the original aims.

Through the efforts of the Society for the first time a separate Section on Anaesthesia has been formed at the Annual South African Medical Congress, and at the first Post-war Medical Congress, which was attended by 500 South African doctors and representatives from England, held in Durban in October, 1946, the opening plenary session was on the "Conquest of Pain," and Congress celebrated the centennial of the first use of ether.

At the conclusion of this plenary session an unofficial motion before the meeting "That the Medical Association of South Africa supports the establishment of the Medical School of Chairs in Anaesthesia" was unanimously passed.⁹

Apart from this very successful plenary session, the anesthetic section was the best attended of all sections, and excellent papers were presented.

The Society has strongly advocated the institution of a D. A. at one of the South African Medical Schools, and has felt that this would further help to elevate the status of anesthesia in South Africa.

Another problem which has been before the South African Society of Anaesthetists recently is the question of Nurse anesthetists at obstetric

deliveries, and the South African Society of Anaesthetists has expressed itself in no uncertain manner.

The membership of the Society has now grown to 50, of whom 15 possess the qualification of Diploma in Anaesthesia of the Royal College of Physicians and Surgeons, England. The rapid growth is due to the fact that many anesthetists are now leaving England to escape from "nationalization of medicine" which seems to be imminent.

A "News Letter" has been started with the idea of keeping members informed of the activities of the Society, and the hope that it may grow into the Journal of the South African Society of Anaesthetists.

1947—What of the Future?

The specialty has made great strides in South Africa in the past 25 years, and in the large centers the standard of anesthesia is high. This is undoubtedly due to the various factors already mentioned.

Unless the medical schools in South Africa fall into line with advances taking place elsewhere in the world, the progress of the specialty will be entirely dependent on those progressive anesthetists who may be fortunate enough to visit you in the United States, and from whom we have gained so much in the past.

There are signs which augur well for the future. A Diploma in Anaesthesia has been instituted at the Witwatersrand University this year, regulations for admission to the examination are closely modelled upon those which allow candidates to sit for the London Diploma in Anaesthesia.

The Medical Association of South Africa, realizing the importance of the specialty have indicated to the medical schools that Chairs should be established. Not only should Chairs in Anesthesia be established, but the universities should provide research facilities in anesthesia.

On this depends the whole future of the specialty, because the problem in South Africa is an educational one to a large extent, and the amount of teaching of anesthesia is woefully deficient, and teaching of anesthesiology is almost nil.

There does not exist at any of the medical schools a well organized department of anesthesia, and the Universities have only now begun to recognize the importance of anesthesia.

We are hoping to find before long some public spirited person who will emulate Lord Nuffield, and endow a Chair in one of the medical schools of South Africa, and so ensure the progress in this all important medical specialty.

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Development of Anesthesiology in Czechoslovakia.*

Emil Schulz, M.D., D.D.S., Prague, Czechoslovakia



ACCEPTED with great pleasure the invitation to address the Twenty-Second International Congress of Anesthetists on the occasion of Dr. Francis Hoeffler McMechan Memorial and I regard it my special duty to recall with affection and appreciation the close association of the name of Dr. McMechan with the history of modern anesthesia in Czechoslovakia, since 1924.

In Czechoslovakia as in France, Austria, Germany and other European countries anesthesia was practiced only as an appendix of surgery and was assigned regularly to nurses. The young physicians regarded anesthesia as a nuisance and were never enthusiastic about its administration. The following were the routine procedures: chloroform was rarely used; ether with ethyl chloride introduction was given by open mask or Ombrédanne's or Schimmelbusch's mask, or by Roth-Draeger apparatus; spinal anesthesia after premedication with ephedrine was given for abdominal operations. Local anesthesia with novocain-adrenalin gave excellent results in abdominal and thoracic surgery in preference to spinal and general anesthesia. Evipan was used intravenously and avertin as a basal anesthetic was employed intrarectally.

My first contact with American anesthesia was established in 1924 and 1925 when I visited the United States and Canada to study modern dentistry, and at the same time to observe methods of inhalation anesthesia. This type of anesthesia was of especial interest to me because of my previous work in plastic surgery. I studied the administration of nitrous oxide and ethylene with the leading men like Dr. McKesson and Dr. Heidbrink, and at the clinics of Dr. Crile and Dr. Mayo.

Returning to Czechoslovakia I became a pioneer of modern anesthesia in our country and introduced the gas anesthesia for all operations in general surgery, gynecology, obstetrics, nose and throat surgery, and dentistry.

I introduced gas anesthesia at the Surgical Clinic of Professor Dr. A. Jirásek, Charles University in Prague. The State Plastic Institute of Professor F. Burian used this method of anesthesia for plastic surgery, and the Gynecological Clinic of Professor F. Ostrčil employed it for gynecological operations.

About this time Dr. and Mrs. McMechan visited me in Prague as I was the only member of the International Anesthesia Research Society in our country. He spent two days with me and was interested to see Prague as well as he could in his wheel chair. I recall how delighted he was to see the fascinating panorama of the old castle Hradčany from the famous old stone-bridge built in the fourteenth century, and how he enjoyed the picturesque view from the castle over the old town with the baroque palaces of the "hundred towered Praha."

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In those two days I learned of his enthusiasm for the specialty of anesthesia to which he had devoted his life; and it was amazing for me to see this ailing man striving only for the improvement of anesthesia, and giving advice and suggestions how to promote it in our country.

He advised me to see Dr. Schmidt in Hamburg, who experimented with acetylene, called narcylene, and urged me to visit also Dr. de Caux of London who administered gas anesthesia in London in the Middlesex Hospital by the intratracheal and intranasal routes. I followed his advice, and studied anesthesia in Hamburg and London. Later I conducted an experimental pharmacologic research on anoxemia due to low percentage of oxygen in nitrous oxide anesthesia, and read a paper on "Nitrous Oxide in General Surgery" at the Surgical Congress in Prague. In 1930 the Surgical Society invited the anesthetist Dr. de Caux and his surgeon Dr. F. Abel of London to operate at the Congress in Prague using nitrous oxide anesthesia.

At this time gas anesthesia was used with great enthusiasm at different hospitals like Jicin and Beroun. The dental profession accepted enthusiastically the new method and in a short time about forty gas machines were imported from the United States. By 1937 nitrous oxide was manufactured in Czechoslovakia. I also introduced ethylene and continued to use it until the outbreak of the war.

As a direct result of the enthusiastic encouragement of Dr. McMechan, the new anesthesia spread so rapidly in our country that probably nowhere on the European continent was gas anesthesia used as much as in Czechoslovakia.

However, the war destroyed this promising start of modern anesthesia in our country. The Germans invaded Czechoslovakia in 1939; the universities and medical schools were closed; hospitals and clinics were used only for the Germans; and Czech patients were crowded into temporary shelters and barracks where no advanced medicine could be performed. At the end of the war we were confronted with the situation that all better anesthetic equipment like the McKesson and Heidbrink gas machines were stolen by the Germans, and during the great fighting with the Germans at the time of the revolution in Prague in May, 1945, not even the simplest anesthetic agent like ether was at hand. We were unable to perform any transfusion, glucose infusion or intravenous anesthesia due to the lack of material and equipment; surgery was performed without anesthesia; no alcohol, opiates, penicillin, or sulphonamides were available.

This lamentable picture prevailed at the time of our liberation in 1945. But relatively soon the immense amount of medical and hospital supplies of UNRRA tremendously helped at the most critical time. With these supplies came some anesthetic gas apparatus, but in some places the young physicians were not familiar with their use and no gas cylinders were supplied, so that the gas apparatus stood idle. The modest amount of literature on anesthesia received with the supplies gave the first stimulus to young physicians to attack the problem of anesthesia.

The Czech and Slovak people are deeply grateful to the American

nation for these vast donations of UNRRA, because without this help our patients would have lacked indefinitely the blessings of modern medicine.

Thus was again established a close contact with American anesthesiology. The Unitarian Medical Mission to Czechoslovakia, called "American Faculty on Wheels," consisting of fourteen outstanding American medical and dental specialists, came to Czechoslovakia in 1946, bringing to the medical and dental profession fresh knowledge and inspiration from new methods, technical and surgical procedures, and drugs. The anesthetist on the staff was Dr. E. A. Rovenstine of New York University, who administered spectacular anesthesia in a case of pneumonectomy and resection of carcinoma of esophagus performed by Dr. A. Brunschwig of the University of Chicago.

The success of this difficult anesthesia was so electrifying for the medical profession that young physicians immediately attacked the problem of anesthesia and of modern anesthesiology as a subject of medical teaching.

The first remarkable result of this American influence was the decision of Dr. Rapant, head of the Surgical Clinic in Olomouc, Moravia, to establish the first special department of anesthesia in our country. Furthermore, the Ministry of Education sent a young physician, Dr. Zdeňek Sery, to the Middlesex County Hospital in London to study modern methods of anesthesia.

All available literature by such authors as Lundy, McIntosh, Bannister, Hewett, Mackenzie and others, was studied. With an American apparatus intratracheal anesthesia was started, in abdominal and thoracic cases pentothal with nitrous oxide-ether was used and intocostirin and tubarine were introduced. Premedication and postoperative treatment was practiced, while during operations transfusions of blood and human and animal plasma were given, blood pressure was measured and proper oxygenation was practiced. In cases of pulmonary infections only pentothal and curare were used.

The reports of the State Plastic Institute of Dr. F. Burrian and of the Surgical Clinic of the University of Olomouc, emphasized that in general, difficulties are encountered in obtaining new apparatus such as the Oxford Vaporizer, Boyle's Machine, intratracheal tubes, and flexible needles for continuous spinal anesthesia. Even our ether is sometimes not absolutely pure. We lack human plasma, protein hydrolysates, amino-acids for cancer patients. There is the greatest need for literature on anesthesia, journals, both new and old, dating even as far back as ten years.

The Czech and Slovak medical profession would appreciate gratefully any suggestion or advice which could help us during this critical time of rehabilitation. So far as we can with our limited means, and with the handicaps resulting from the war, we are anxious to follow the American example of progress in anesthesiology and we hope that the first endeavor to teach anesthesia and establish it as an independent subject of study will be followed by similar action in other universities in Czechoslovakia.

It is essential in Czechoslovakia to establish for the future the specialty of anesthesia.

There is one more reason why anesthesiology should be established: In impoverished Europe the former dominant centers of medical teaching in Germany and Austria, for many years at least, are no longer active. Their functions could be undertaken by Czechoslovakia for Southeastern Europe. Now more and more of our physicians are trained in the United States and Great Britain instead of in France, Germany and Austria. Therefore Czechoslovakia could easily become a teaching center in anesthesiology and a connecting scientific link between East and West.

In closing I want to express the deep gratitude I owe to the late Dr. and Mrs. McMechan for advice and encouragement, and to all the other American anesthetists who have contributed to the advancement of our anesthesia since 1924. Furthermore, we gratefully acknowledge our debt to UNRRA for material help and to the Unitarian Medical Mission for inspiration which resulted in a new interest in the specialty of anesthesia in Czechoslovakia.

In Homage to Doctor McMechan.*

Prof. Lucien Dautrebande, Liege, Belgium



IT IS INDEED a great honor for me to have been invited by your distinguished President to add my modest contribution to the manifestations of homage to Doctor McMechan. I met him only once, at Rocky River in 1933, but that one meeting remains engraved in my memory so clearly that since then I have always been able to recall him without effort.

As a Professor of Pharmacology in a country where anesthesia was a neglected science, I had always hoped to be able to study in America the modern techniques of anesthesiology. I knew the works of your masters, I had been exchanging scientific information with them, and through them had learned that there existed among anesthetists in the United States a close bond, in the form of a vital and highly scientific magazine. I had also learned that the life of this magazine was engendered by the will of an animator without peer, whose determination matched his eclecticism. Thus, on my first visit to your country I resolved to meet Doctor McMechan.

I relive today the emotion which I experienced upon finding myself in the presence of this great man, motionless yet so active, confined to his chair, but with a spirit so mobile, as intelligent as it was fine, cordial as it was penetrating. Above all, however, I was touched by the brightness of the inner fire which animated him from the time the science of anesthesia was begun. He was not only the enlightened administrator of his journal, but also the coordinator of the sciences of anesthesiology. All work directly connected with technique was, of course, familiar to him, but also that which, to a specialist, might have seemed too far removed. He knew of all the links which united physiology, biochemistry, pharmacology to his science, and he was anxious to see each day bring closer the relationship uniting the functioning of the central nervous system and that of the pulmonary and tissular respiration, circulation, and the hepatic and renal functions.

He foresaw with certainty the day, which is undoubtedly near, when pharmacology will furnish to the anesthetist a product which will exclusively block all of the sensitive terminals, while full consciousness is maintained. The adrenolitics, synthetic antihistaminics, have opened up a route which must soon lead to what could have seemed only a dream fifteen years ago.

I left Doctor McMechan, bearing away not only the memory of an outstanding man, but also an invaluable lesson, a lesson in foresight, a lesson in energy, constancy, hope. He promised me the aid of his organization for the realization of a project which I had cherished for many years, that of seeing anesthesia taught as an autonomous science. And in 1935, despite the difficulties inherent in every new venture, aided by our most eminent Belgian oculist, Professor Weekers of Liège (to

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whom I am pleased to render homage from afar) my laboratory timidly began some postgraduate courses in anesthesia, theoretical and practical, open to the doctors of our four Belgian universities. The success of these courses proved that they were a necessity. I continued them each year with the enlightened cooperation of Doctors Philippot and Dallemagne. Their essence was summarized in the book which I had the honor to deposit last year upon the desk of your Congress, and which it was my privilege to dedicate to the memory of Doctor McMechan.

This effort had another happy consequence, that of seeing a Belgian Anesthesia Society created, numbering more than 100 members, and where the most renowned of our Belgian masters, Sebrechts, Danis, Albert, Lauwers, Goffaerts, occupy the tribune brilliantly.

No one was happier for this realization than Doctor McMechan. From the first year of existence of the school, he sent me his encouragement and advice and told me of his hopes to see one day in all universities throughout the world the science of anesthesia honored as is its due, that is to say, as one of the most difficult, most complex, most complete sciences.

These marks of esteem, from a man like him, were the brightest reward for me, and it was with a most particular joy that I was able to save from the devastation of my laboratory the large silver plaque with which your society was kind enough to honor me in October 1939. I hold it precious, in souvenir of all of you, dear colleagues of the United States, associating with it always the memory of Doctor McMechan, whose life was an example and a blessing.

His work survives him, and before his death he knew the joy of seeing the torch he held for so long taken up by his admirable helpmate, before whom we today lay the homage of our sympathy and our respect.

A Tribute to Dr. F. H. McMechan.*

Harold R. Griffith, M.D., F.I.C.A., Montreal, Canada



RECENTLY I came across the following quotation in the "Lincoln Reader,"—it was the recollection of a young American immigrant after his first meeting with Abraham Lincoln. I quote it from the Lincoln Reader.

"When, in a tone of perfect ingenuousness, he asked me—a young beginner—what I thought about this and that, I should have felt myself very much honored by his confidence, had he permitted me to regard him as a great man. But he talked in so simple and familiar a strain, and his manner and homely phrase were so absolutely free from any semblance of self-consciousness or pretension to superiority, that I soon felt as if I had known him all my life and we had long been close friends."

These words might have been said with equal truth about Dr. F. H. McMechan. I shall never forget my own first meeting with him, twenty-five years ago. He was visiting Montreal for a meeting of anesthetists, and a friend brought me, a young beginner in medicine, up to Dr. McMechan in his wheel chair and introduced us. In a few friendly words he made me believe that anesthesia was worth doing well and spoke as though I could be an important new addition to the workers. Five years later, when I first felt that I had something worth presenting at an anesthetists' meeting, I was welcomed and encouraged, and received the kind of help from him which he was always ready to give freely to young men. Friendliness was the keynote of all his activities. He built up the foundation of cooperation, enthusiasm, and friendship, which is present more strongly in the specialty of anesthesiology than in any other medical group.

During the War it was my privilege to assist in the training of a large number of medical officers in the Canadian Armed Forces. In Montreal we had a cooperative program, embracing French and English anesthetists in our various hospitals. We met on Monday evenings for a general discussion of the previous week's work. At one of these sessions I remember entertaining, as a visitor, the Director of Medical Services. In his remarks he stated that he had chanced to meet with a "Missionary Society" rather than a group of ordinary physicians. He thought it a joke, but I accepted the remark as a compliment. It was pleasant to hear that in our own group McMechan's "soul goes marching on."

In Canada, McMechan was a friend to anesthetists from the earliest day of the specialty. He attended our meetings whenever he was able to travel, and many times when he was really too sick to travel. His last visit was in 1932, when he came to Montreal to unveil in the operating room of the old Hôtel Dieu Hospital a tablet in memory of Charles Larocque, beloved French-Canadian anesthetist. Out of this visit there

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has grown a unique cooperation between the French and English anesthesiologists of the Province of Quebec. Today anesthesiology throughout Canada is on a high level, with recognized professional status of the specialty. There exist active teaching departments and research programs in the medical colleges, and well-organized departments of anesthesia in most of the hospitals. It seems that these things are the culmination of the work which McMechan began almost single handed, and for which he fought so bravely for many years.

I cannot end this tribute to Dr. McMechan without a word about his wife. No man was ever more blessed by a helpmate than he. She was his hands and his feet, his ambassador to all the world, his *alter ego*. How valiantly she has carried on, continuing to do the work which he began, keeping together this great world-wide circle of friends, making us all respect each other more because of friendship to her. It shall be my aim to see that all young men who come to me for training in anesthesia shall know about Dr. McMechan, and I shall endeavor to have them progress in their work with the spirit which he instilled into us.

